



## TerraWave Solutions® TWS-400 Coaxial Cable

TerraWave's **TWS-400** series cable is designed for easy installation with maximum flexibility where curves, bends and twists rule out the use of standard hard-line transmission cables. The cable is constructed of a UV resistant polyethylene Jack (F)et providing maximum durability and protection from harsh elements and is designed for any application requiring high-quality, flexible cabling such as WLL, GPS, WLAN, WISP, WiMax, SCADA and mobile applications. TerraWave's cable is compatible with a wide variety of connectors and is ideal for any off-the-shelf or customized cable assembly.



TerraWave Part Number: TWS-400

Construction Specification		
	Material	Diameter
Inner Conductor	Copper Clad Aluminum	0.108" ± 0.001"
Dielectric	Physical Foam Polyethylene	0.285" ± 0.005"
Outer Conductor	Bonded Aluminum Foil + Tinned Copper Braid	Nominal 0.320"
Jacket	Black Polyethylene	0.40" ± 0.008"

Electrical Characteristics	
Capacitance	23.9 pF/ft
Impedance	50 Ω
Inductance	.060 μH/ft
Velocity	85%
Inner Conductor DC Resistance	< 1.39 (Ω/1000 ft)
Outer Conductor DC Resistance	< 1.65 (Ω/1000 ft)
Shielding Effectiveness	> 90 dB
Jacket Spark	5000 VAC
Cut off Frequency	16.2 GHz
Peak Power	16 kW

Mechanical and Environmental Characteristics	
Min. Bend Radius	2.008"
Storage Temperature	-70° F to +185° F
Installation Temperature	-40° F to +185° F
Operating Temperature	-40° F to +185° F

General Information	
Warranty	5 Years
Life Expectancy	20 Years for Outdoor Use



Attenuation and Avg. Power (68° F)			
Frequency MHz	Typical Attenuation dB/100 ft	Max Attenuation dB/100 ft	Average Power kW
30	0.7	0.86	2.91
50	0.9	1.05	2.21
150	1.5	1.7	1.28
220	1.9	2.1	1.05
450	2.7	3	0.72
900	3.9	4.5	0.5
1500	5.1	5.8	0.38
1800	5.7	6.1	0.34
2000	6	6.5	0.33
2500	6.8	7.7	0.29
5800	10.8	12.2	0.18

**TerraWave Solutions® TWS-400 Coaxial Cable (continued)  
Connectors for TWS-400 Series Cable**



**TWS-400 Series  
RPTNC Bulkhead Jack (F)**



**TWS-400 Series  
TNC Plug (M)**



**TWS-400 Series  
N-Style Plug (M)**

TerraWave Part Number	Description
CON-01-400	RPTNC Jack (F)
CON-02-400	RPTNC Plug (M)
CON-03-400	RPTNC BH Jack (F)
CON-04-400	TNC Jack (F)
CON-05-400	TNC Plug (M)
CON-06-400	N-Style Jack (F)
CON-07-400	N-Style Plug (M)
CON-07-400-RA	RA N-Style Plug (M)
CON-08-400	N-Style BH Jack (F)
CON-09-400	RP N-Style Jack (F)

TerraWave Part Number	Description
CON-10-400	RP N-Style Plug (M)
CON-11-400	BNC Jack (F)
CON-12-400	BNC Plug (M)
CON-13-400	RPBNC Jack (F)
CON-14-400	RPBNC Plug (M)
CON-15-400	RPBNC BH Jack (F)
CON-17-400	SMA Jack (F)
CON-18-400	SMA Plug (M)
CON-19-400	RPSMA Jack (F)
CON-20-400	RPSMA Plug (M)

**Crimping and Stripping Tools for TWS-400 Series Cable**

TerraWave Part Number	Product Description
HT-336K	Crimp Tool
HT-322C1	2-Blade Strip Tool
HT-322S3	3-Blade Strip Tool
TWS-CTK-400	3-Blade Strip and Crimp Tool Kit



**TWS-400 Series  
HT-336K Crimp Tool**



**TWS-400 Series  
HT-22S3 3-Blade Strip Tool**

**Connector Adapters for TWS-400 Connectors**

TerraWave Part Number	Product Description
RARPTNCJ-RPTNCP	RA RPTNC Jack (F) to RPTNC Plug (M)
RPTNCJACK-NPLUG	RPTNC Jack (F) to N-Style Plug (M)
RPTNCP-NJ	RPTNC Plug (M) to N-Style Jack (F)
RPTNCP-NP	RPTNC Plug (M) to N-Style Plug (M)
RPTNCP-RPSMAJ	RPTNC Plug (M) to RPSMA Jack (F)
NJACK-NJACK	N-Style Jack (F) to N-Style Jack (F)
NM-NM	N-Style Plug (M) to N-Style Plug (M)
SMAP-TNCJ	SMA Plug (M) to TNC Jack (F)
AXA-SMSM	SMA Jack (F) to SMA Jack (F)



**N-Style Plug (M)  
to N-Style Plug (M)**



**RA RPTNC Jack (F)  
to RPTNC Plug (M)**

**RoHS**